Actuate Coding Exercise

Time: 2-5 Hours

Overview

At Actuate, engineers rapidly prototype and build new functionality across our entire stack on a regular basis. As such we'd like to evaluate your ability to code a holistic solution to a problem from scratch.

If you decide to simplify any aspect you would otherwise make more sophisticated in order to stay in the allotted time frame, please make note of it in the README file. (e.g. I used this in memory data structure but in production would use a persistent database).

We will be looking for attention to detail and a solution you would feel confident could be deployed and used.

Requirements

Deliver an Http Server that does the following

- Allows the Client to send a URL to be shortened. Note: The same unique long URL should ALWAYS be shortened to the same unique short URL
 - a. Input: URL to be shortened
 - b. Returns: Shortened URL
- Allows the Client to send a shortened URL and obtain the original, long URL
 - a. Input: Shortened URL
 - b. Returns: Original Long URL
- 3. Redirection of the shortened URL to the Original URL
- 4. Extra Credit:
 - a. A click counting mechanism, to see how many times people have "Clicked on" a shortened URL

Please provide a README with your deliverable that explains how to run your code.